

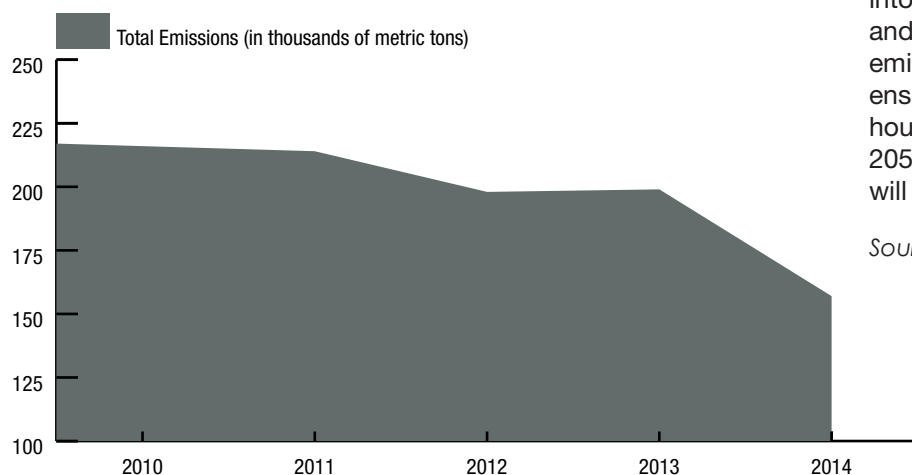
# Caltrans Measures Reduction in Greenhouse Gases from Its Operations

The Climate Change Branch of Caltrans' Division of Transportation Planning collects data on the greenhouse gases emitted from Caltrans' fleet of vehicles, assortment of buildings and network of lights and signals.

Overall, greenhouse gas emissions from those sources have declined from 217,485 metric tons in 2010 to 157,185 metric tons in 2014. The most dramatic decrease came from a reduction of emissions associated with street lighting, which includes roadway lights, message boards, signage illumination and traffic signals.

Greenhouse Gases 2010-2014 (in metric tons)					
	2010	2011	2012	2013	2014
Vehicle Fuels	118,042	115,118	112,758	108,810	105,338
Building Electricity & Gas	35,336	38,019	29,028	36,075	30,039
Street Lighting	64,107	61,270	56,638	54,339	21,808
<b>Total Emissions</b>	<b>217,485</b>	<b>214,407</b>	<b>198,424</b>	<b>199,224</b>	<b>157,185</b>

Until last year, street lighting showed the same gradual decrease as the other measured sources, but as Caltrans switched to efficient LED lighting, greenhouse gas emissions from lighting dropped more than half, from 54,339 metric tons in 2013 to 21,808 metric tons in 2014. The decrease in emissions runs parallel with the increase of efficient lighting. In 2012, Caltrans' LED inventory was about 1,500. By 2014, that inventory had grown to about 23,000.



Caltrans' 12,000-piece fleet of cars, trucks and maintenance vehicles emitted 112,758 metric tons of greenhouse gases in 2012. By 2014, that number had been reduced to 105,338, likely due to a combination of fleet management practices and an increase in the number of low- and zero-emission vehicles.

Governor Brown's Executive Order [B-18-12](#) directed all state agencies to take steps to make state buildings more sustainable and energy efficient. To comply, Caltrans is requiring that all new buildings be designed to meet Leadership and Energy and Environmental Design (LEED) Silver or better certification rating standards. LEED is an international certification and verification program that strives to conserve resources through wiser "green" building design. In July, the new Maintenance Complex that will service the San Francisco-Oakland Bay Bridge opened with a Gold LEED rating. Building-related emissions were reported at 38,109 metric tons in 2011, and have decreased to 30,039 metric tons in 2014.

Although this data set does not include all the emissions within the department's operations nor all emissions identified in Caltrans' 2015–20 Strategic Management Plan—which is designed to provide a safe, sustainable, integrated and efficient system to enhance California's economy and livability—it represents a large percentage.

In April, Governor Brown issued Executive Order [B-30-15](#), requiring state agencies to take climate change into account in their planning and investment decisions and to implement measures to reduce greenhouse gas emissions. It is intended to step up California's efforts to ensure the state can meet its target of reducing greenhouse gas emissions to 80 percent below 1990 levels by 2050. Caltrans efforts will increase, and those increases will be reflected in future Mile Markers.

Source: Division of Transportation Planning,  
Climate Change Branch  
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